Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, D.C. 20554

In the Matter of	)	
	)	
Modifications of Part 2 and 15 of the Commission's Rules for Unlicensed Devices and Equipment Approval	))))	ET Docket No. 03-201

REPLY COMMENTS OF THE LICENSE-EXEMPT ALLIANCE

The License-Exempt Alliance ("LEA") hereby submits its reply comments in response to the Commission's *Notice of Proposed Rulemaking ("NPRM")* in the above-captioned proceeding.

In its initial comments, the LEA voiced support for the Commission's proposals to (1) permit certain advanced antenna technologies to utilize the higher gain permitted for point-to-point operations in the license-exempt 2.4 GHz band, (2) adopt more flexible rules for replacement antennas on intentional radiators, and (3) eliminate the ongoing confusion about professional installation by including a clear definition of "professional installer" in Part 15 of its Rules. Other commenting parties generally have expressed strong support for these proposals, and the LEA thus urges that they be adopted as soon as possible.

Unfortunately, satellite DARS provider Sirius Satellite Radio, Inc. ("Sirius") impermissibly goes beyond the scope of this proceeding by yet again recommending (with very meager technical analysis) that the Commission impose tighter out-of-band emission limits on license-exempt devices in the 2400-2483.5 GHz band. To dispose of Sirius's argument, the Commission need look no further than the following language from its *Second Report and Order* in its Part 15 "spread spectrum" docket (ET Docket No. 99-231):

> The adequacy of the current out-of band emission limits applicable to Part 15 spread spectrum devices operating in the 2.4 GHz band is beyond the scope of

> this proceeding. . . At no time has out-of-band emission limits been at issue . . . Furthermore, Sirius does not provide sufficient information for the Commission or interested parties to evaluate the validity of its claims. For example, Sirius does not identify the basis of its proposed out-of-band emission limits, and it fails to address implementation or enforcement aspects of its proposal. If Sirius wishes the Commission to give its concerns full consideration it may file appropriate documentation with the Commission detailing its interference claims and describing what action might be appropriate to ameliorate such interference. However, we will not act on this matter herein.[1]

Even if the Commission were to overlook the procedural impropriety of Sirius's argument (and it should not), the fact remains that *both Sirius and its competitor XM Radio, Inc. have previously conceded that Part 15 devices in the 2.4 GHz band are not causing harmful interference to SDARS operations.* Less than two years ago, for example, Sirius acknowledged that "there is no problem right now,"[2] and XM Radio admitted that "a recent study shows that SDARS frequencies at present are free of virtually any noise."[3] Also, one FCC official has been quoted as saying that "[w]e're not aware of any problems with the existing emission limits" for Part 15 devices operating in the 2.4 GHz band.[4] Nonetheless, relying on surmise and little else, Sirius effectively contends that the Commission must adopt its out-of-band emissions proposal to

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[1] *Amendment of Part 15 of the Commission's Rules Regarding Spread Spectrum Devices*, 17 FCC Rcd 10755, 10767 (2002). Sirius's argument is little more than a rehash of its 2002 rulemaking proposal on Part 15 emissions limits that it has since withdrawn. *See* Petition for Rulemaking filed by Sirius Satellite Radio Inc. re: Revision of Part 15 and Part 18 of the Rules Regarding the Out-Of-Band Emissions of Radio Frequency Devices, RM-_____ (filed Jan. 23, 2002).

[2] Charny, "Will Wi-Fi Overwhelm Satellite Radio?" *CNET News.com* (Apr. 8, 2002), at http://news.com.com/2100-1033-877572.html. *See also* Welton, "Parties Differ on Effect of FCC Petition"(Apr. 2, 2002), at http://www.anywhereyougo.com/wireless/article.po?id=3961813 ("[Sirius] acknowledges that the [Sirius Petition for Rulemaking] . . . was not filed because Sirius subscribers were experiencing interference from stray signals now.").

[3] Comments of XM Radio, Inc., ET Docket No. 01-278, at (ii) (filed Feb. 12, 2002). Similarly, XM cited no instances of harmful interference from Part 15 devices since it commenced service in September 2001.

[4] *See* Welton, n. 2 *supra*

protect them it from the possibility that the proliferation of Part 15 devices *may* eventually cause interference to SDARS operations at some unknown level at some unknown location(s) at some undetermined point in the future. This, of course, will not do – as previously observed by Chairman Powell, "undue speculation about potential harm can always be invoked to justify continued regulation,"[5] and it otherwise is well settled that rule proposals grounded in speculation cannot be squared with the Commission's overriding obligation to "put itself in a position to know" whether the alleged problem "is a real or fanciful threat."[6]

Furthermore, any notion that Sirius is the victim of unforeseen circumstances cannot be taken seriously. The Part 15 out-of-band emission limits of which Sirius now complains were originally adopted by the Commission in 1989, *i.e.*, six years prior to the Commission's allocation of spectrum for SDARS, eight years prior to the Commission's auction of SDARS spectrum and twelve years prior to XM's launch of its SDARS system.[7] Moreover, just one week after the SDARS auction, the Commission amended its rules to reduce the potential emissions from spread spectrum devices into the SDARS band.[8] Sirius offers no explanation for its previous silence on any of this, nor does it explain why it could not have designed its systems

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[5] Dissenting Statement of Commissioner Michael K. Powell re: *Rulemaking to Amend Parts 1, 2, 21 and 25 of the Commission's Rules to Redesignate the 27.5-29.5 GHz Frequency Band, to Reallocate the 29.5-30.0 GHz Frequency Band, To Establish Rules and Policies for Local Multipoint Distribution Service and for Fixed Satellite Services*, 14 FCC Rcd 21520, 21556 (1999).

[6] *Home Box Office, Inc. v. FCC*, 567 F.2d 9, 50 (D.C. Cir. 1977), *cert. denied*, 434 U.S. 829 (1977). *See also City of Chicago v. FPC*, 458 F.2d 731, 742 (D.C. Cir. 1971), *cert. denied*, 405 U.S. 1074 (1972) (a "regulation perfectly reasonable and appropriate in the face of a given problem [is] highly capricious if that problem does not exist").

[7] *See* XM Comments at 2, 6-7.

[8] *See* Reply Comments of Intersil Corporation, ET Docket No. 01-278, at 6 (filed Mar. 12, 2002) (the "Intersil Reply Comments").

to accommodate Part 15 emissions that they knew were permissible under the Commission's rules years before the SDARS allocation/auction and the subsequent launch of SDARS service.[9]

Similarly, the marketplace growth of Part 15 devices should not have taken Sirius by surprise. Indeed, even Sirius/XM's most ardent supporters have long been aware of Bluetooth's commercial potential. XM, for example, has frequently noted that its SDARS service was named "Product of the Year" by *Fortune*, citing to an article in the December 24, 2001 issue by Peter Lewis.[10] Yet in an article published in the same magazine on October 9, 2000 (nearly a year before XM launched its "Product of the Year"), Mr. Lewis wrote: "A few years from now all new household appliances -- smart phones, cell phones, TV sets, kitchen appliances, digital cameras, printers, garage-door openers, air conditioners-- will come with Bluetooth networking capabilities and will be able to talk to one another."[11]

Finally, even if the Commission were to overlook the fact that Sirius has asked the agency to address a problem that does not exist in a proceeding where the issue has not been raised, there is nothing in Sirius's sparse technical showing that would even begin to justify any further inquiry into the matter, much less a revision of the Commission's rules. In fact, previous Commission filings by Motorola, Inc. and Intersil Corporation demonstrate that Sirius/XM's speculation about potential interference is attributable to weaknesses in their own system design,

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[9] *See* Reply Comments of Motorola, Inc., ET Docket No. 01-278, at 1-2 (filed Mar. 12, 2002) ("[I]t should be noted that nothing has changed the interference environment for either Sirius or XM since the Commission originally authorized the service, [so] the designers of these systems should have been fully aware, and factored into the design, [the fact] that other devices are authorized to emit signals at the Part 15 levels that Sirius and XM are now raising concerns [about].") ("Motorola Reply Comments").

[10] XM Comments at 4 n.4.

[11] *See* http://www.fortune.com/indexw.jhtml?channel=artcol.jhtml&doc_id=00000496.

flaws in their technical assumptions and their failure to account for the compensatory effects of their terrestrial repeater networks.[12] Moreover, Sirius predictably omits any discussion of who should bear the cost of equipment modifications to protect ill-designed SDARS receivers.

In sum, license-exempt service providers and equipment vendors have made substantial investments and deployed facilities in reliance on Commission rules and policies that have been in effect for years, and to which Sirius never objected even though it has had more than ample opportunity to do so. It is also evident from the Commission's own prior findings and related marketplace developments that consumers are now beginning to realize the full benefits of the Commission's ongoing effort to promote deployment and use of Part 15 devices for broadband service. Now, Sirius belatedly seeks to reverse those gains with a showing that is procedurally infirm and barren of merit. The Commission has not been fooled by such tactics

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[12] *See, e.g.,* Motorola Reply Comments at 6 ("802.11b devices have penetrated a significant market, yet no real data has been provided that interference from these devices will cause interference, in fact measurements performed on behalf of XM indicate other sources are more likely to cause interference. Interestingly enough in the filing by XM the main source of interference is not the equipment operating in the 2.4 GHz band but interference from vehicle ignition noise."); Intersil Reply Comments at 7 ("Sirius describes a link with a system margin for fading and attenuation of 6.7 dB. This is insufficient for reliable commercial operation in other than a line-of-sight application. Evidence of inadequate design is buttressed by the DARS providers' need to supplement their satellites with a network of 1500 terrestrial repeaters at up to 40 kW. . . Along with patching up an unsuccessful design, the repeater network also eliminates most Part 15 interference concerns. . . The DARS providers do not seriously attempt to argue that repeater transmissions will suffer interference from Part 15, so the urban areas with the highest Part 15 densities should also be those with the least interference into DARS, thanks to the repeaters.").

before and should not be fooled now. Sirius's out-of-band emissions proposal for Part 15 devices in the 2.4 GHz band should be rejected.

Respectfully submitted,

LICENSE-EXEMPT ALLIANCE

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